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JUN 2 - 1965

CURRENT SERIAL RECORDS

WATER SUPPLY OUTLOOK

FEDERAL - STATE - PRIVATE COOPERATIVE SNOW SURVEYS

for

UTAH

UNITED STATES DEPARTMENT of AGRICULTURE...SOIL CONSERVATION SERVICE, and

STATE ENGINEER of UTAH

In cooperation with U.S. Forest Service, Bureau of Reclamation, Utah Fish and Game Dept., Utah Agricultural Experiment Station, U.S. National Park Service, U.S. Geological Survey; and other Federal, State, and private organizations.

MAY 1, 1965

UNITED STATES DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE

To Recipients of Water Supply Outlook Reports:

The climate of the cultivated and populated areas of the West is characterized by relatively dry summer months. Such precipitation as occurs falls mostly in the winter and early spring months when it is of little immediate benefit to growing crops. Most of this precipitation falls as mountain snow which stays on the ground for months, melting later to sustain streamflow during the period of greatest demand during late spring and summer. Thus, nature provides in mountain snow an imposing water storage facility.

The amount of water stored in mountain snow varies from place to place as well as from year to year and accordingly, so does the runoff of the streams. The best seasonal management of variable western water supplies results from advance estimates of the streamflow.

A snow survey consists of a series of about ten samples taken with specially designed snow sampling equipment along a permanently marked line, up to 1000 feet in length, called a snow course. The use of snow sampling equipment provides snow depth and water equivalent values for each sampling point. The average of these values is reported as the snow survey measurement for a snow course.

Snow surveys are made monthly or semi-monthly beginning in January or February and continue through the snow season until April, May or June. Currently more than 1400 western snow courses are measured each year. These measurements furnish the key data for water supply forecasts.

Streamflow forecasts are obtained by a comparison of total or maximum snow accumulation, as measured by snow water equivalent, to the subsequent spring and summer or snowmelt season runoff over a period of years. The snow water equivalent measured in selected snow courses provides most of the index to the streamflow forecast for the following season. More accurate forecasts are usually obtained when other factors such as soil moisture, base flow and spring precipitation are considered and included in the forecast procedure. Early season forecasts assume average climatic conditions through the snowmelt season.

Listed below are the Federal-State-Private Cooperative Snow Survey and Water Supply Forecast reports available for the West which contain detailed information on snow survey measurements, streamflow forecasts, reservoir storage, soil moisture and other guide data to water management and conservation decisions. Soil Conservation Service Reports may be secured from Soil Conservation Service, 511 N.W. Broadway - Room 507, Portland, Oregon 97209.

PUBLISHED BY SOIL CONSERVATION SERVICE

REPORTS	ISSUED	LOCATION	COOPERATING WITH
RIVER BASINS			
WESTERN UNITED STATES	MONTHLY (FEBMAY)	PORTLAND, OREGON	_ ALL COOPERATORS
BASIC DATA SUMMARY	OCTOBER 1	PORTLANO, OREGON	_ ALL COOPERATORS
STATES			
ALASKA	MONTHLY (MARMAY)	PALMER, ALASKA	ALASKA S.C.D.
AR I ZON A	SEMI-MONTHLY (JAN.15 - APR.1)		SALT R. VALLEY WATER USERS ASSOC. ARIZ. AGR. EXP. STATION
COLORADO AND NEW MÉXICO	MONTHLY (FEBMAY)	FORT COLLINS, COLORAGO	COLO. STATE UNIVERSITY COLO. STATE ENGINEER N. MEX. STATE ENGINEER
I DAHO	MONTHLY (JANJUNE)	BOISE, IOAHO	IOAHO STATE RECLAMATION ENGINEER
MONTANA	MONTHLY (JANJUNE).	BOZEMAN, MONTANA	MONT. AGR. EXP. STATION
NE VA O A	MONTHLY (JANMAY)	RENO, NEVAOA	NEVAGA DEPT. OF CONSERVATION AND NATURAL RESOURCES DIVISION OF WATER RESOURCES
ORE GON	MONTHLY (JANJUNE).	PORTLAND, OREGON	OREG. STATE UNIVERSITY OREGON STATE ENGINEER
UTAH	MONTHLY (JANJUNE).	SALT LAKE CITY, UTAH_	UTAH STATE ENGINEER
WASHINGTON	MONTHLY (FEBJUNE)	_ SPOKANE, WASHINGTON	WN. STATE DEPT. OF CONSERVATION
WYOMING	MONTHLY (FEBJUNE)_	CASPER, WYOMING	WYOMING STATE ENGINEER
	PUBLISHED !	BY OTHER AGENCIES	
REPORTS	ISSUED		AGENCY
BRITISH COLUMBIA	MONTHLY (FEBJUNE)	WATER RESOURC FOREST AND WATE VICTORIA, B.C.,	ES SERVICE, DEPT. OF LANOS, R RESOURCES, PARLIAMENT BLOG., CANAGA
CALIFORNIA	MONTHLY (FEBMAY)	CALIF. DEPT. OF SACRAMENTO, CAL	WATER RESOURCES, P.O. BOX 388,

WATER SUPPLY OUTLOOK

FEDERAL - STATE - PRIVATE COOPERATIVE SNOW SURVEYS for UTAH

MAY 1, 1965

Report prepared by

GREGORY L. PEARSON - GARRY DINSDALE and

Patricia Paramore

SOIL CONSERVATION SERVICE SNOW SURVEY SECTION FEDERAL BLDG., ROOM 4012 SALT LAKE CITY UTAH 84111

Issued by

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STATE ENGINEER

STATE OF UTAH

SALT LAKE CITY, UTAH

J.A. LIBBY

STATE CONSERVATIONIST

SOIL CONSERVATION SERVICE

SALT LAKE CITY, UTAH

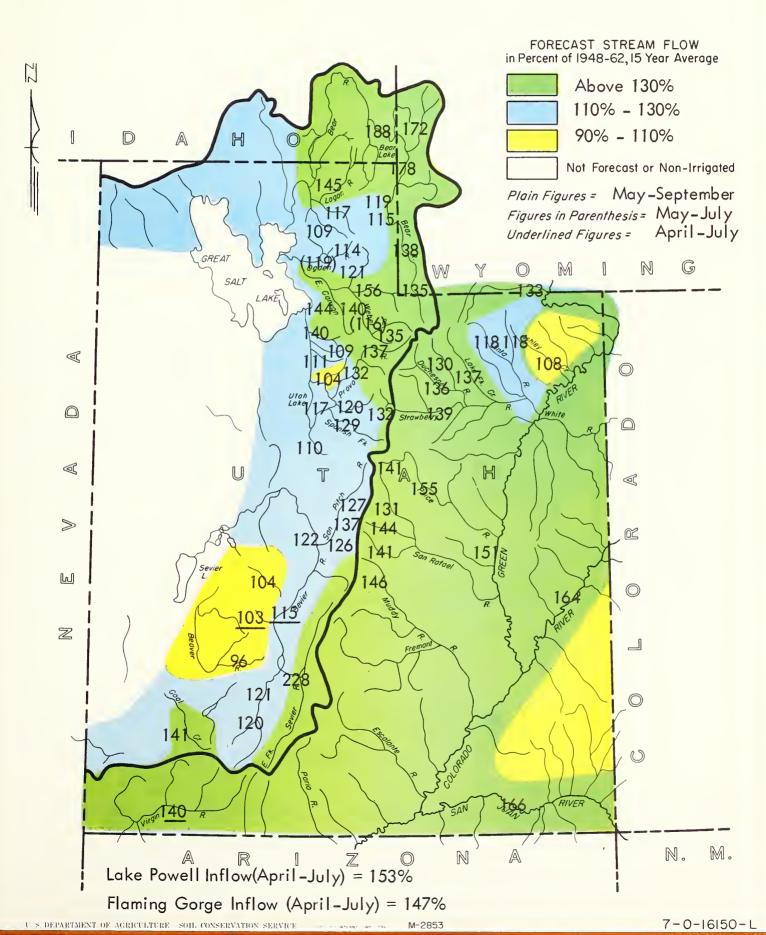
DR. D.W. THORNE
DIRECTOR
UTAH AGRICULTURAL
EXPERIMENT STATION
LOGAN, UTAH



PROSPECTIVE WATER SUPPLIES

Based on Snow Surveys Made on UTAH and BEAR RIVER WATERSHEDS







WATER SUPPLY OUTLOOK

as of

MAY 5. 1965

With the exception of a few stations near Salt Lake and Farmington, snowfall in the mountains during April was much above average throughout the entire state. Most mountain stations recorded from about 1.5 to over 3.5 times their usual amounts for the month.

Storms were particularly heavy on the Santa Clara, Virgin, Escalante and East Fork Sevier Rivers, where snowfall varied from about 3 to 5.5 times average amounts. The greatest amount of precipitation measured at any station was recorded at the Webster Flat gage(elevation 9200 ft.) on the Virgin river. Here the reading of 11.80 inches compares with the average April amount of 2.95 inches.

The next highest reading was at the Widtsoe-Escalante Summit gage(elevation 9500) between the East Fork Sevier and Escalante rivers. This gage recorded 9.85 inches precipitation during the month and compares with the April average of 1.80 inches. The total amount of water which had fallen at this station between last October 1 and April 1st this year was 10.41 inches, so that the amount which fell during April very nearly equaled the total of the preceding six months.

As a result of these storms, the water outlook has changed from what was only a fair outlook a month ago to an exceptionally good one for water users served by the Virgin, Sevier, Paria and Escalante rivers, and the smaller streams near Cedar City and Parowan. Except for the East Fork Sevier near Kingston where the May-September streamflow is forecast at 228% of average, the other streams named are expected to yield from about 120% to 140% of average.

Although the outlook also improved on other southern streams, it was not nearly as noticeable on the Beaver river, Clear Creek near Sevier, the streams near Fillmore and in southeastern Utah near Moab, Monticello and Blanding. Forecasts for these streams now range from 96% on the Beaver river to about 110% in the Monticello-Blanding area.



Forecasts of the May thru September streamflow range from 130% to 155% of the 1948-62 average for most of the remaining Utah streams which are tributary to the Green and Colorado rivers. Included in this group of streams are the Fremont, Muddy, San Rafael, Price, Strawberry, Duchesne and Lake Fork rivers. The exceptions include Ashley and Brush Creeks near Vernal along with the smaller streams east of them. These should yield from 5% to 10% above average flows. The Whiterocks and Uintah rivers are forecast at 118%

Along the Sevier river, the inflow to the river between Kingston and Vermillion Dam is expected to be 15% above average with about 2,000 to 3,000 acre feet occuring above the primary right of 400 second feet. Inflow from Vermillion Dam to Gunnison is forecast at 20% above average with 6,000 to 7,000 acre feet above 360 second feet. Inflow to Sevier Bridge reservoir for the balance of the season is forecast at 50,000 acre feet, or 122% of average. The tributaries of the San Pitch are expected to flow at about 125% to 135%.

Of the streams tributary to Utah Lake and others between this area and the Idaho line, we find that the lowest forecast is for the American Fork river near American Fork at 4% above average. Streams where forecasts range from about 130% to 160% include the upper Provo, Weber, Logan and Bear rivers, as well as smaller streams such as Parley's Creek near Salt Lake, East Canyon Creek near Morgan and Chalk Creek near Coalville.

About 10% to 30% above average is expected from the remaining northern Utah streams.

Flow of the Logan river will be comparable to that in the highest two or three years of the last 40 years. Smith's Fork of the Bear river near Cokeville, Wyoming, Thomas Fork near Geneva, Idaho, Montpelier and Georgetown Creeks in Idaho and adjacent streams near them are expected to yield about 170% to 180% of average. Flow of these streams is expected to equal or exceed anything measured since 1940.



Parley's Crk nr SLC

FORECAST POINT	FORECAST THIS YEAR	FORECAST PERIOD	LAST YEAR	AVERAGE b	THIS YEAR AS PERCENT OF AVERAGE
BEAR RIVER SYSTEM	GREAT	BASIN			
Bear at Harer, Idaho Bear nr Randolph Bear nr Ut-Wyo State Line Bear nr Woodruff Big Crk nr Randolph, Utah Blacksmith Fork nr Hyrum (4) Little Bear nr Paradise Logan nr Logan (3) Smith's Fork nr Border, Wyoming Woodruff Crk nr Woodruff, Utah	380 123 147 130 8.8 56 28 170 174	May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept	252 96 121 131 3.4 45 33 114 118 14.2	202 69 109 94 7.4* 48 25.7 117 101 14.6*	117 109 145 172
WEBER-OGDEN RIVERS					
Chalk Crk at Coalville East Canyon Crk nr Morgan (7) Lost Crk nr Croydon, Utah Pineview Reservoir Inflow (8) So Fork Ogden nr Huntsville Wanship Reservoir Inflow (5) Weber nr Coalville (6) Weber nr Oakley	45 23 16 86 50 145 150 118	May-Sept May-Sept May-July May-Sept May-July May-Sept May-Sept May-Sept May-Sept	37 18.6 12.9 80 57 123 101 132	28.9 16.0 13.2 72 44 99 * 107 89	156 144 121 119 114 146 140 133 135
PROVO RIVER & UTAH LAKE					
American Fork nr American Fork Hobble Crk nr Springville Fayson Creek nr Payson Provo nr Hailstone (10) Provo at Vivian Park (11) Spanish Fork at Thistle Strawberry Reservoir Inflow (9) Utah Lake Inflow	31 17.5 6.6 130 155 40 50 240	May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept	32 15.8 118 23.0 44 246	29.7 14.6 6.0 95 * 117 31 38 205	104 120 110 137 132 129 132 117
JORDAN RIVER & SALT LAKE					
Big Cottonwood nr SLC Little Cottonwood Crk nr SLC	38 40	May-Sept May-Sept	40 40	35 36	109 111

May-Sept

14.7

140

10.0

⁽¹⁾ Measured flow plus change in storage in Woodruff Narrows Reservoir. (2) Measured flow plus change in storage in Porcupine Reservoir. (3) Includes U.P.& L. Co. tailrace and Logan, Hyde Park & Smithfield Canal. (4) Above Utah Power & Light Company's dam. (5) Observed flow Weber River near Wanship, Utah, plus change in storage in Wanship Reservoir, plus diversion by Weber-Provo Canal. (6) Includes diversion by Weber-Provo Canal and change in storage in Wanship Reservoir. (7) Observed flow plus change in storage in East Canyon Reservoir. (8) Inflow record as computed by U.S. Bureau of Reclamation. (9) Change in storage plus diversion thru Strawberry tunnel. (10) Observed flow minus diversions thru Duchesne tunnel and Weber-Provo Canal. (11) Observed flow plus change in storage in Deer Creek reservoir, minus diversions thru Duchesne tunnel & Weber-Provo Canal, plus diversion thru Salt Lake Aqueduct.



UTAH STREAMFLOW FORECASTS a (1,000 Ac. Ft.)

UTAH STREAMFLOW FORECASTS a (1,000 Ac.	Ft.)				
FORECAST POINT	FORECAST THIS YEAR		LAST YEAR	AVERAGE AS	HIS YEAR PERCENT AVERAGE
SEVIER RIVER					
Chalk Creek nr Fillmore Clear Crk nr Sevier (Abv.Div.) East Fork Sevier nr Kingston (12)	13.5 10.2 20 28	May-Sept May-June May-June May-Sept	16.7 11.4 8.7 12.1	13.0 9.9* 8.0 12.3	104 103 250 228
Inflow Kingston to Vermillion Dam	45	Apr-June		39	115
Vermillion Dam to Gunnison Salina Crk at Salina (14) Sevier nr Circleville Sevier nr Gunnison a Sevier at Hatch	71 13 40 50 31 47	Mar-June May-June May-Sept May-Sept May-June May-Sept	5.1 17.4 22.6 20.8 30.6	59 6.8* 33 * 41 25.8 39	120 191 121 122 120 120
Sevier nr Kingston Sevier below Piute Dam (13)	18.5 24 70	May-June May-Sept May-Sept	5.5 6.9 17.0	13.5 18.1 30	137 133 233
SAN PITCH RIVER					
Ephraim Creek nr Ephraim Pleasant Crk nr Mt. Pleasant Twin Crk nr Mt. Pleasant	18.2 11.2 5.7	May-Sept May-Sept May-S ^e pt	 8.3 4.5	14.5 8.8 * 4.3 *	1 2 6 1 2 7 1 3 3
BEAVER RIVER					
Beaver nr Beaver	15.5 21.5	May-June May-Sept	12.7 18.8	16.1 22.3	96 96
Rockyford Reservoir Inflow (15)	4	May-June	1.4	6.7	60
COAL CREEK					
Coal Crk nr Cedar City	18	May-Sept	13.2	12.8	141
COL	ORADO RIVE	R BASIN			
GREEN RIVER TRIBUTARIES IN UTAH FLAMING GORGE TO DUCHESNE RIVER					
Ashley Creek nr Vernal Henry's Fork at Linwood	57 38	May-Sept May-Sept	54 	53 28.5	108 133

⁽¹²⁾ Observed flow plus change in storage in Otter Creek Reservoir. (13) Observed flow plus change in storage in Otter Crk & Piute Reservoirs. (14) Gage is below diversions near Salina. (15) Observed flow at Rockyford Dam, corrected for change in storage in Rockyford Reservoir. (16) Observed flow plus diversion through Duchesne Tunnel.



FORECAST POINT	FORECAST THIS YEAR	FORECAST PERIOD	LAST YEAR	AVERAGE AS	HIS YEAR PERCENT AVERAGE
DUCHESNE RIVER					
Duchesne at Provo River (Trail nr Hanna) Duchesne nr Tabiona (16) Lakefork below Moon Lake (17) Rock Crk nr Mtn. Home Strawberry at Duchesne Uinta nr Neola Whiterocks nr Whiterocks Yellowstone nr Altonah	50 141 93 127 82 106 72 95	May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept May-Sept	116 84 115 51 123 71 86	33 * 104 68 98 59 90 61	152 136 137 130 139 118 118
PRICE RIVER					
Gooseberry Crk nr Scofield Price nr Heiner (18) Scofield Reservoir Inflow (18)	14.5 82 45	May-Sept May-Sept May-Sept	11.3 45 29.6	10.9 53 32	133 155 141
SAN RAFAEL RIVER					
Cottonwood Crk nr Orangeville Ferron Crk nr Ferron Huntington Crk nr Huntington	75 55 68	May-Sept May-Sept May-Sept	43 32 44	52 39 52	144 141 131
MUDDY RIVER					
Muddy Creek nr Emery	30	May-Sept	17.2	20.5 *	146
VIRGIN RIVER					
Virgin nr Virgin	60	Apr-June	37	43	140
UPPER COLORADO BASIN					
Flaming Gorge Inflow (19) Lake Powell Inflow (8) Green at Green River, Utah (19) 4,	400 660 800 370 600	May-Sept Apr-July Apr-July May-Sept May-Sept	2310 1180 5483 2614 574	3291 1129 7692 2899 963	164 147 153 151 166

GENERAL FOOTNOTES

⁽¹⁷⁾ Observed flow plus change in storage in Moon Lake Reservoir. (18) Observed flow plus change in storage in Scofield Reservoir. (19) Observed flow plus change in storage in Flaming Gorge and Big Sandy Reservoirs. (20) Observed flow plus change in storage in Navajo Reservoir. (21) Observed flow at Lee's Ferry plus change in storage in Flaming Gorge, Navajo, Lake Powell and Big Sandy.

⁽a) Runoff forecasts are based principally on mountain snow cover and on the assumption that precipitation and temperature will be near average from the present time to the end of the forecast period. Appreciable deviations from normal of temperature and/or precipitation will correspondingly modify these forecasts. The discharge data is taken from preliminary records of the U.S. Geological Survey. (b) 1948-62, 15 year period. *Partly estimated.



BASIN or STREAM	RESERVOIR	USABLE	MEASURED (FIRST OF MONTH)			
		CAPACITY	THIS YEAR	LAST YEAR	AVERAGE	

GREAT BASIN

Bear River	Bear Lake Woodruff Narrows	1421.0 26.5	1016.8 18.0	802.9 26.2	983.5
Beaver River	Rocky Ford	23.3	9.2	8.5	13.7
Little Bear	Hyrum Porcupine	15.3 11.3	16.0 11.3	15.3	14.4
0gden	Pineview	110.0	97.4	60.3	33.6
Provo	Deer Creek	149.7	95.3	102.3	104.7
Sevier River	Otter Creek Piute Sevier Bridge	52.5 74.0 236.1	24.4 20.2 57.3	-	
Spanish Fork	Strawberry	270.0	76.9	64.1	149.3
Utah Lake	Utah Lake (b)	1149.0	542.3	395.2	650.3
Weber	East Canyon Echo Rockport Willard Bay	28.7 73.9 60.9 215.0	2.9 46.1 37.6 145.8	24.5 53.5 35.1	21.1 51.1
	COLORADO RI	VER DRAINAGE			
Ashley Creek	Steinaker	33.3	18.0	11.5	
Colorado	Lake Powell	27,000.0%	6,171.0	2,656.0	
Green	Flaming Gorge	3,789.0*	584.6	945.3	
Lake Fork	Moon Lake	35.8	14.3	22.9	16.4
Price River	Scofield	65.8	19.5	15.2	25.4
San Juan	Navajo	1,709.0*	388.4	372.6	

All data contained in this table supplied by the U.S. Geological Survey.

⁽a) 1948-62 average. (b) Active capacity taken at 3.1 feet above comprosition. (c) Partly estimated.

⁽d) Total capacity reported.



GREAT BASIN DRAINAGE

UPPER BEAR RIVER (Above Harer, Idaho)							
Big Park Burts-Miller Ranch CCC Camp x Hayden Fork Kelly Ranger Station Monte Cristo R. S. Piney LaBarge x Poison Meadows x Salt River Summit x Stillwater Camp Trial Lake x	10G11 10J6 10G7 10J7 10G12 11H12 10G10 10G6 10G8 10J17 10J8	8700 7900 7500 9300 8200 8960 8820 8500 7900 8550 9800	4/28 4/23 4/29 4/28 4/28 4/30 4/30 4/29 4/23	70 10 20 56 66 74 52 93 37 36 92	30.7 4.7 8.7 22.8 29.6 32.6 25.0 41.8 17.8 13.9 38.8	21.2 2.8 12.3 18.0 19.4 27.1 19.1 31.0 16.3 11.2 24.9	20.0* 0.0* 4.6* 17.7* 15.9* 26.2* 18.5 30.9* 9.8* 7.5* 30.9*
LOWER BEAR RIVER (Below Harer, Idaho)							
Beaver Crk-Skunk Crk. Dry Bread Pond x Emigrant Summit Garden City Summit Klondike Narrows Little Bear (lower) Little Bear (upper) Monte Cristo R.S. Oxford Mountain Steep Hollow #1 Steep Hollow #2 Strawberry Creek Strawberry Mink Divide Tony Grove R. S. Willow Flat	11H14 11H13 11G6 11H7 11H1 11H26 11H25 11H12 12G3 11H27 11H28 11G9 11G10 11H3 11G4	7150 8230 7700 7600 7400 6100 6850 8960 6800 8500 7700 5800 6800 6250 6100	4/28 4/29 4/30 4/30 4/27 4/27 4/28 No F 4/30 4/30 4/23 4/27 4/30 4/27	14 46 65 51 43 0 74 eport 112 69 0 47 0 14	5.4 19.2 33.0 22.7 21.8 0.0 0.0 32.6 51.6 34.6 0.0 23.3 0.0 6.4	8.6 18.0 24.6 16.2 17.3 0.0 5.3 27.1 37.2 24.9 5.3 16.6 1.4 6.2	3.4* 13.5* 14.5* 13.9* Trace* 1.3* 26.2* 1.4* 38.5* 22.5* 1.3* 13.3* 0.6* 2.4*
OGDEN RIVER							
Beaver Crk-Skunk Crk. Ben Lomond (lower) Ben Lomond Peak Ben Lomond Trail Cutler Creek Dry Bread Pond Horse Ridge Monte Cristo R.S. Sagebrush Flat	11H14 11H9 11H8 11H30 11H29 11H13 11H21 11H12	7150 5850 8000 6000 6780 8230 8260 8960 6300	4/28 4/27 4/27 4/27 4/27 4/28 4/29 4/28 4/28	14 89 10 60 46 56 74	5.4 1.6 40.9 4.7 26.8 19.2 26.2 32.6 0.0	8.6 8.9 33.6 7.4 24.8 18.0 22.6 27.1 0.0	3.4* 3.6* 32.3* 13.5* 26.2* 0.0*



311011			Cor	THE CONTRACTOR OF THE CONTRACT	TRIBATION		
DRAINAGE BASIN and SNOW COURSE		DATE OF SNOW DEPTH WATER CONTENT		WATER CONTENT (Inches)			
NAME	NO.	ELEVATION	SURVEY	(Inches)	(Inches)	LAST YEAR AVI	ERAGE
WEBER RIVER							
Beaver Creek R. S. Chalk Creek #1 Chalk Creek #2 Chalk Creek #3 Farmington Canyon(lower) Farmington Canyon(upper) Horse Ridge Kilfore Creek Lamb's Canyon x Lost Creek Reservoir Parley's Canyon Smt. Redden Mine(lower) Redden Mine(upper) Silver Lake x Smith & Morehouse Trial Lake x	11J24 11J1 11J2 11J3 11J12 11J11 11H21 11H31 11J14 11J15 11J15 11J16 11J5 11J16 11J4 10J8	7500 9100 8000 7500 6950 8000 8260 7300 6600 6125 7500 8500 9000 8725 7600 9800	4/28 4/27 4/27 4/27 4/29 4/29 4/29 4/30 4/29 5/1 4/29 4/29 4/29 4/29 4/28	3 80 46 7 38 77 56 24 19 0 32 53 69 35 92	1.6 33.6 19.1 3.4 16.6 35.6 26.2 10.2 7.6 0.0 15.4 22.2 25.9 31.4 16.3 38.8	3.0 23.8 16.2 6.5 24.5 28.7 22.6 11.1 12.0 0.0 19.1 17.5 20.0 26.2 12.1 24.9	1.5* 25.5* 12.3* 1.7* 21.2* 30.4* 6.5* 11.5* 16.8* 18.9* 26.8* 5.9* 30.9*
PROVO RIVER & UTAH LAKE							
Camp Altamont Clear Creek Ridge #1 Clear Creek Ridge #2 Clear Creek Ridge #3 Daniels-Strawberry Smt. Dutchman R.S. Hobble Creek Summit Packard Canyon Payson R. S. Rock Bridge Soapstone R.S. Timpanogos Divide Trial Lake	11J20 11K21 11K22 11K23 11J23 11J17 11J22 11J31 11K1 11K2 11J25 11J21 10J8	7300 9200 8000 6600 8000 7500 7300 6400 8050 6750 7800 8140 9800	4/29 4/28 4/28 4/28 4/30 4/29 4/27 4/27 4/27 4/27 4/28 4/29 4/28	15 56 34 0 22 25 18 0 41 1 32 54 92	6.5 24.4 14.2 0.0 9.6 11.5 8.3 0.0 17.2 0.5 14.1 24.3 38.8	8.4 17.6 10.0 0.0 11.7 12.1 11.8 4.1 15.6 9.8 11.1 18.9 24.9	6.5* 16.2* 8.0* 0.1* 8.4* 9.5* 6.1* 1.0* 13.2* 4.6* 5.5* 18.4
JORDAN RIVER & TOOELE VAL	LEY						
,		6450 6600 7000 7400 7500 8900 8725	4/29 4/30 4/30 4/29 5/1 4/29 4/29	Trace 19 16 42 32 80 69	Trace 7.6 7.2 19.9 15.4 35.8 31.4	7.4 12.0 16.3 21.3 19.1 27.4 26.2	2.3* 6.5* 7.4* 13.1* 11.5* 27.2* 26.8*

PAST RECORD

CURRENT INFORMATION

SNOW



SNOW			CU	RRENT IN	IFORMATION	PAST R	ECORD
DRAINAGE BASIN and SN			DATE OF	SNOW DE	, CONTENT	WATER CONT	ENT (Inches)
NAME	NO.	ELEVATION	SURVEY	(Inches	(Inches)	LAST TEAR	AVERAGE
UPPER SEVIER RIVER (South of Richfield, Uta	<u>h)</u>						
Big Flat x Box Creek Castle Valley Cedar Breaks Duck Creek R.S. Fish Lake Harris Flat Kimberly Mine Midway Valley Panguitch Lake Squaw Springs Widtsoe-Escalante Smt. Widtsoe-Escalante #2 Widtsoe-Escalante #3 LOWER SEVIER RIVER (Including San Pitch Rive	12L7 12L4 12M13 12M1 12M4 11L3 12M5 12L6 12M2 12M7 12L5 11M1 11M2 11M3	10290 9800 9700 10390 8560 8700 7700 8900 9800 9300 9500 9500	4/27 4/28 4/26 4/27 4/30 4/29 4/30 4/27 4/26 4/28 4/30 4/30 4/30	67 46 43 78 39 17 16 48 79 4 22 31 36 43	24.1 16.8 15.3 29.3 15.2 5.0 6.4 17.6 29.0 1.0 6.2 12.2 12.5 16.4	16.0 10.2 7.2 16.3 6.8 0.7 0.0 16.7 17.6 0.0 2.7 3.3 6.6 8.5	20.2* 11.5* 7.0* 19.2* 5.2* 3.0* 0.3* 13.5* 21.4* 0.0* 2.9* 2.5* 6.3* 10.0*
Beaver Dams Farnsworth Lake G.B.R.C. Headquarters G.B.R.C. Meadows Gooseberry R. S. Gooseberry Reservoir x Mammoth R. SCtnwod.Crk. Mt. Baldy R. S. Pickle Keg Springs Pine Creek Salina Creek(lower) Shingle Mill White Gate	11K13 11L1 11K11 11K10 11L2 11K4	8000 9900 8700 10000 8400 8700 8800 9500 9600 8700 7250 6200 9350	4/27 4/28 4/30 4/30 4/28 4/29 4/29 4/27 4/26 4/26 4/28 4/26	20 71 50 80 38 53 53 79 43 36 0	8.8 28.7 20.9 35.9 14.8 23.1 23.5 33.2 17.5 15.0 0.0 0.0 10.1	9.6 22.1 16.2 25.2 11.3 20.0 20.4 20.0 15.4 4.1	6.7* 19.8* 14.7* 28.5* 7.3* 17.9* 18.8* 24.8* 12.2* 1.1*
BEAVER RIVER Big Flat Merchant's Valley Otter Lake	12L7 12L9 12L8	10000 8200 9300	4/27 4/27 4/27	67 23 53	24.1 7.2 18.2	16.0 3.6 11.2	20.2* 3.5*
	1210	9,500	7/4/	7)	10.2	11.2	14.5%
PAROWAN CREEK							
Ed Ward Flat Yankee Reservoir	12M12	8300	4/28		8.9	2.9	1.4*
Talikee Nesel Voil	12M11	8700	4/28	38	14.1	8.2	5.6*
COAL CREEK Cedar Breaks Midway Valley x Urie Flat Webster Flat (a) 1948-62, 15 year p tion: Water content es	12M2 12M10 12M3	9800 8450 9200 Aberage of al	4/27 4/27 4/29 4/29 record. 8-62, 15 year	79 21 5x) Adja	29.3 29.0 7.8 229 d Sainage.	16.3 17.6 0.0 (A) 12:2 obse	21.4%



SNOW			CUF	RENT INFOR	MATION	PAST R	ECORD
DRAINAGE BASIN and SNOW	COURSE		DATE OF	SNOW DEPTH	WATER	WATER CONT	,
NAME	NO.	ELEVATION	SURVEY	(Inches)	CONTENT (Inches)	LAST YEAR	AVERAGE

COLORADO RIVER DRAINAGE

UPPER	GREEN	RIVER	ΙN	UTAH	
(Tribu	utaries	above	F1	aming	Gorge)

Black's Fork Jct.	10J22	8925	4/21	39	14.9	10.1	
Buck Pasture A	10J23	9700	Dela	yed Da	ta		
East Fk.Black's Fk.G.S.	10J21	9300	4/21	42	15.8	12.8	
Henry's Fork A	10J24	10200	Dela	yed Da	ta	13.0	
Hewinta Guard Station	10 J4	9500	4/22	40	14.3	13.1	12.1%
Hickerson Park	9 J8	9100	4/23	18	5.7	8.8	
Spirit Lake	9J7	10300	4/23	53	17.9	17.9	
Steel Creek Park	10J20	9900	4/22	68	25.4	17.6	

GREEN RIVER TRIBUTARIES BETWEEN FLAMING GORGE & DUCHESNE RIVER

Ashley Twin Lakes A	9J11	10 <i>5</i> 00	Delayed Data	12.5	
Kings Cabin(lower)	9J2	8600	4/22 38 11.8	6.4	5.5×
Kings Cabin(upper)	9J1	8730	4/22 46 14.3	8.5	7.9%
Reynolds Park	9J10	10400	Delayed Data	16.0	
Windy Park	9J12	9400	Delayed Data	3.5	

DUCHESNE RIVER

Atwood Basin A	10J27	10250	Dela	yed Da	ta	7.5	
Chepeta-Whiterocks Lks A	9J9	10300	Dela	yed Da	ta	12.0	
Daniels-Strawberry Smt.x	11J23	8000	4/30	22	9.6	11.7	8.4%
Five Point Lake A	10J26	11000	Dela	yed Da	ta	16.2	
Indian Canyon	10K1	9100	4/29	53	21.4	11.7	8.4%
Julius Park	916	9800	4/27		17.0	12.6	13.9*
Lakefork Basin	10J25	11100	Dela	yed Da	ta	30.0	
Lakefork Mountain	10J10	10500	4/26	53	17.6	12.9	12.0%
Lakefork Mountain #2	10J11	8900	4/26	29	10.1	4.1	2.6%
Lakefork Mountain #3	10J12	8100	4/26	17	5.1	0.9	0.3%
Mosby Mountain	9J5	9500	4/27	44	13.6	9.0	10.1%
Paradise Park	9J3	10100	4/27	51	15.9	9.9	13.0%
Soapstone R. S. x	11J25	7800	4/28	32	14.1	11.1	5.5*
Trial Lake x	10J8	9800	4/28	92	38.8	24.9	30.9*
White River #1 x	10K2	8600	4/29	40	16.6	12.6	10.5%
			,				
DDIOC DIVED							

PRICE RIVER

PRICE RIVER							
Corral	10K5	8200	4/30	29	11.2		
Dry Valley Divide	11K8	7800	4/28	21	8.0	5.2	4.5%
Gooseberry Reservoir	11K4	8700	4/29	53	23.1	20.0	17.9%
Grassy Trail Crk-Left Fk.	10K3	7970	4/30	28	10.2		
Indian Canyon x	10K1	9100	4/29	53	21.4	11.7	8.4%
Mammoth R.SCtnwd.Crk.x	11K3	8800	4/29	53	23.5	20.4	18.8*
Mud Creek #2	11K33	8300	4/28	46	18.1	8.5	7.1%
Timberline	10K6	9100	4/30	. 55	22.1	′ – –	11.5%

(a) 1948-62, 15 year period. (b) Average of all past record. (x) Adjacent drainage. (A) Aerial observation: Water content estimated. * Estimated 1948-62, 15 year average.



SNOW			CU	RRENT IN	FORMATION	PAST REC	CORD
DRAINAGE BASIN and SNOV		ELEVATION	DATE OF SURVEY	SNOW DEP	[(:() N F N	WATER CONTER	VERAGE
NAME	NO.	ELEVATION	3011721		(IIICHES)		
PRICE RIVER - Continued							
White River #1 White River #2 White River #3	10K2 11K24 11K25	8600 7600 7400	4/29 4/29 4/29	40 7 0	16.6 2.6 0.0	12.6 2.1 0.0	10.5* 1.2* 0.2*
SAN RAFAEL RIVER							
Buck Flat Gooseberry Reservoir Mammoth R.SCtnwd.Crk.x Red Pine Ridge Rush Pond Seely Creek R.S. Stuart R.S. Switchback Upper Joe's Valley Wrigley Creek	11K31 11K4 11K3 11K28 11K38 11K9 11K27 11K26 11K29 11K32	9400 8700 8800 9400 9800 10000 7950 8600 8800 9000	4/26 4/29 4/29 4/27 4/26 4/30 5/3 5/3 4/26 4/26	63 53 53 60 57 63 0 31 32 46	24.4 23.1 23.5 24.5 21.4 24.1 0.0 13.0 12.1 15.4	13.4 20.0 20.4 14.4 9.1 12.7 Trace 15.3 3.8 5.9	16.5% 17.9% 18.8% 14.2% 12.0% 16.1% 1.3% 13.1% 4.4% 6.5%
MUDDY RIVER							
Mt. Baldy R.S. x	11K12	9500	4/27	79	33.2	20.0	24.8%
FREMONT RIVER							
Black's Flat-U.M. Crk. Farnsworth Lake x Fish Lake Johnson Valley	11L4 11L1 11L3 11L6	9250 9900 8700 8850	4/29 4/28 4/29 4/29	34 71 17 21	12.5 28.7 5.0 5.7	7.6 22.1 0.7 4.0	8.0* 19.8* 3.0* 3.3*
ESCALANTE RIVER							
Widtsoe-Escalante Smt. Widtsoe-Escalante #2 Widtsoe-Escalante #3	11M1 11M2 11M3	9500	4/30 4/30 4/30	36	12.2 12.5 16.4	3.3 6.6 8.5	6.3*
VIRGIN RIVER							
Cedar Breaks x Duck Creek R.S. Harris Flat Midway Valley x Webster Flat	12M1 12M4 12M5 12M2 12M3	10390 8560 7700 9800 9200	4/27 4/30 4/30 4/27 4/29		29.3 15.2 6.4 29.0 20.8	16.3 6.8 0.0 17.6 12.9	19.2* 5.2* 0.3* 21.4* 9.5*
SOUTHEASTERN UTAH DRAINAG	GES						
Buckboard Flat Camp Jackson LaSal Mountain LaSal Mountain(upper)	9M1 9M2 9L1 9L2	9000 8600 8800 9600	4/22 4/22 4/23 4/23	39 36 10 39	14.8 13.0 3.0 14.5	4.5 3.4 4.1 11.4	3.1* 2.3*



PRECIPITATION DATA (Inches)

-	MEGIFFIATION DATA (IIICIICS)									
DRAINAGE BASIN		CURRENT INFORMATION			FROM APPROX. 10/1 TO DATE					
L	AND RAIN GAGE LOCATION			MONTH'S PRECIPITATION	1948 - 62 AVERAGE	THIS YEAR	1948 - 62 AVERAGE	PERCENT OF AVERAGE		
					a		a			
GREAT BASIN DRAINAGE										

UPPER BEAR RIVER (Above Harer, Idaho)							
Chalk Creek #2* Chalk Creek #3* Hayden Fork Monte Cristo #2 Salt River Summit Stillwater Camp Trial Lake*	8000 7500 9300 8960 7900 8550 9800	4/27 4/27 4/23 4/28 4/29 4/23 4/28	3.48 2.95 4.09 7.11 1.80 3.05 4.60	2.15 4.65 2.50 1.65 3.40	23.60 19.78 26.98 36.93 24.60 17.88 34.63	18.95 33.15 20.50 14.65 27.20	124 111 120 122 127
LOWER BEAR RIVER (Below Harer, Idaho)							
Dry Bread Pond Garden City Summit Klondike Narrows Little Bear (upper) Monte Cristo #2 Tony Grove R.S. (SCS) Willow Flat	8230 7600 7400 6850 8960 6250 6100	4/28 4/30 4/30 4/27 4/28 4/30 4/27	6.63 3.46 4.31 5.68 7.11 3.09 4.70	3 05 2.40 3.25 2.60 4.65 3.95	32.14 31.68 38.45 27.95 36.93 29.95	25.05 21.60 26.70 22.10 33.15 27.70	128 147 144 126 111
OGDEN RIVER							
Ben Lomond(lower) Ben Lomond Trail Causey Dam Dry Bread Pond Horse Ridge Monte Cristo #2* Sagebrush Flat	5850 6000 5500 3230 8260 8960 6300	4/27 4/27 4/28 4/28 4/29 4/28 4/28	7.54 7.85 3.82 6.63 4.16 7.11 N.R.	3.25 3.40 3.05 4.65 2.25	36.85 38.62 19.11 32.14 36.05 36.93	29.25 30.70 25.05 33.15 16.85	126 126 128 111
WEBER RIVER							
Chalk Creek #1 Chalk Creek #2 Chalk Creek #3 Farmington Guard Sta.(1) Farmington Rice (1) Horse Ridge Lost Creek Reservoir Mt. Dell Dam (2)* Parley's Canyon Smt. Redden Mine (upper) Silver Lake(Brighton)(2)* Smith & Morehouse Trial Lake*	9100 8000 7500 7500 7000 8260 6125 5500 7500 9000 8725 7600 9800	4/27 4/27 4/29 4/29 4/29 4/29 4/30 5/1 4/29 4/30 4/26 4/28	4.55 3.48 2.95 3.58 4.00 4.16 3.42 2.30 4.93 5.68 5.37 3.95 4.60	2.15 	23.60 19.78 35.83 32.80 36.05 17.47 21.26 32.20 37.69 26.29 34.63	18.95 34.40 31.99a 15.64a 24.30 32.99a 21.20 27.20	125 104 103 136 133 114 124 127



PRECIPITATION DATA (Inches)

DRAINAGE BASIN	E. E	CURRE			FROM APPE	ROX. 10/1 TO 1	
AND RAIN GAGE LOCATION	ELEVATIO	N DATE OF READING	MONTH'S PRECIPITATION	1948 - 62 AVERAGE	THIS YEAR	AVERAGE	RCENT OF AVERAGE
PROVO RIVER & UTAH LAKE				а		а	
Clear Creek Ridge #2 Daniels-Strawberry Smt. Dutchman R. S. East Portal Ridge Hobble Creek Smt. Payson R. S. Soapstone R. S. Strawberry ResE. Portal Timpanogos Divide Trial Lake	8000 8000 7500 7800 7300 8050 7800 7606 8200 9800	4/28 4/30 4/29 4/29 4/27 4/27 4/28 4/29 4/29 4/28	3.70 3.45 4.40 2.90 3.32 4.48 2.90 1.40 5.25 4.60	2.50 2.40 2.70 2.40 3.30 2.20 1.37a 2.70a 3.40	22.21 25.07 28.77 23.66 23.00 25.32 23.46 13.40 30.83 34.63	19.00 21.20 29.45 20.20 20.90 18.70 11.96a 29.45a 27.20	117 118 98 114 121 125 112 105 127
JORDAN RIVER & TOOELE VALLE	ΞY						
Middle Canyon Mt. Dell Dam (2) Parley's Canyon Smt. Silver Lake(Brighton)(2)	7000 5500 7500 8725	4/30 4/30 5/1 4/30	5.40 2.30 4.93 5.37	3.50 2.33a 2.80 3.68a	26.48 21.26 32.20 37.69	20.30 15.64a 24.30 32.99a	130 136 133 114
SEVIER RIVER ABOVE RICHFIEL	_D_						
Big Flat* Box Creek Castle Valley Cedar Breaks Duck Creek R.S. Fish Lake Kimberly Mine Panguitch Lake Webster Flat * Widtsoe-Escalante #3 Widtsoe R. S.	10290 9800 9700 10390 8560 8700 8900 8200 9200 9500 7600	4/27 4/28 4/26 4/27 4/30 4/29 No Re 4/26 4/29 4/30 4/30	6.87 4.32 7.78 9.50 9.68 2.57 port 2.60 11.80 9.85 2.40	3.15 1.90 2.40 3.15 2.90 1.53 2.85 1.10 2.95 1.80 0.75a	23.98 19.75 21.69 26.57 25.15 12.85 29.97 20.26 6.10	21.85 15.40 19.20 25.15 22.40 8.96 21.40 8.65 24.00 14.60 5.98a	110 128 113 106 112 143 125 139 102
SEVIER RIVER BELOW RICHFIER (Including San Pitch River)							
Beaver Dams Farnsworth Lake G.B.R.C. Headquarters(1) G.B.R.C. Meadows(1) G.B.R.C. Oaks (1) Gooseberry R.S. (1) Gooseberry Reservoir* Mammoth R. S. #2* Mt. Baldy R.S. Pickle Keg Springs Pine Creek Salina Creek (lower) Shingle Mill White Gate (1) Data supplied by U.S estimated except those wh	8000 9900 8700 10000 7655 7800 8700 8600 9500 9600 8700 7250 6200 9350 5. Forest Sei	4/27 4/28 4/30 4/30 4/30 4/28 4/29 4/29 4/26 4/26 4/28 4/26 4/28	3.49 4.22 4.18 5.51 2.34 3.14 4.44 4.03 5.99 2.84 4.55 1.48 2.80 2.20 ta supplied b	2.50 2.65 3.41a 3.55a 2.24a 1.85 2.80 2.75 	19.06 28.87 25.68 30.89 16.67 21.11 25.78 26.82 25.05 19.26 27.37 10.53 18.36 13.56 her Bureau.	17.70 21.80 22.45a 24.82a 15.52a 15.10 21.60 21.45 27.40 17.50 a - all value	108 132 114 124 107 140 119 125 100 105



PRECIPITATION DATA (Inches)

PRECIPITATION DATA (TIICHES)	1	OUDDS.	NT INFORMAT	1011	50044 4000	0 10 /1 TO D	*
DRAINAGE BASIN AND RAIN GAGE LOCATION	ELEVATION	DATE OF READING	NT INFORMAT MONTH'S PRECIPITATION	1948 - 62 AVERAGE	THIS YEAR		ENT OF ERAGE
BEAVER RIVER	<u>.</u>			a		а	
Beaver Canyon P.H.(2)	7275 10290	4/30 4/27	2.54 6.87	1.85a 3.15	10.65 23.98	12.19a 21.85	87 110
PAROWAN CREEK		, ,			-500		
Yankee Reservoir	8700	4/28	3.88	1.65	18.42	13.60	135
COAL CREEK							
	10390 9200	,	9.50 11.80	3.15 2.95	26.57 29.97	25.15 24.00	106 125
ENTERPRISE TO NEW HARMONY D	RAINAGE						
,	6100 8000	4/29 4/30	8.33 6.45	2.00 2.30	18.40 19.20	13.90 16.30	132 118
	COLORA	OO RIVER	DRAINAGE				
UPPER GREEN RIVER IN UTAH (Tributaries above Flaming)	Gorge)						
Burnt Creek E.Fk. Black's Fk. G.S. Hewinta G. S.	8925 7900 9300 9500 10300	4/21 4/23 4/21 4/22 4/23	2.85 2.15 2.93 4.05 5.52	 	19.30 11.87 17.30 19.20 19.25	 	
GREEN RIVER TRIBUTARIES BETY FLAMING GORGE & DUCHESNE RIV							
, 5	8500 8730	4/23 4/22	5.53 6.51	 2.20	17.38 15.53	 14.95	 104
DUCHESNE RIVER							
Currant Creek Daniels-Strawberry Smt.* East Portal Ridge* Indian Canyon Jackson Park Julius Park Lakefork Mountain Moon Lake Mosby Mountain Paradise Park Rock Creek	10800 7800 7800 7800 9100 10650 9800 10500 8150 9500 10100 7900	/ -	2.71 3.45 2.90 4.65		12.15 16.99	15.10 21.20 17.35 16.90 15.80 9.34 a 18.10 13.50 18.70	116 118 127 104 127 130 107 123 125

⁽¹⁾ Data supplied by U.S. Forest Service. (2) Data supplied by U.S. Weather Bureau. a - all values estimated except those where symbol "a" occurs. *Adjacent drainage.



DRAINAGE BASIN		CURRE			FROM APPROX. IO			
AND RAIN GAGE LOCATION	ELEVATION	N DATE OF READING	MONTH'S PRECIPITATION	1948 - 62 AVERAGE	THIS YEAR	1948-62 P AVERAGE	ERCENT OF AVERAGE	
				а		а		
<u>DUCHESNE RIVER</u> - Continued								
	7606 9800 8600	4/29 4/28 4/29	1.40 4.60 3.50	1.37a 3.40 2.25	13.40 34.63 20.20	11.96a 27.20 18.25	112 127 111	
PRICE RIVER								
Gooseberry Reservoir Indian Canyon Mammoth R. S. #2 Mud Creek	9100 8600	4/28 4/29 4/29 4/29 4/28 4/29	3.70 4.44 4.65 4.03 4.30 3.50	2.50 2.80 2.15 2.75 2.60 2.25	22.21 25.78 21.99 26.82 25.20 20.20	19.00 21.60 17.35 21.45 18.10 18.25	117 119 127 125 139	
SAN RAFAEL RIVER								
G.B.R.C. Meadows*(1) Gooseberry Reservoir* Red Pine Ridge	9400 10000 8700 9400 79 <i>5</i> 0	4/26 4/30 4/29 4/27 5/31	5.30 5.51 4.44 4.40 3.10	3.10 3.55a 2.80 3.50 2.40	26.60 30.89 25.78 30.50 20.25	20.25 24.82a 21.60 24.20 15.30	131 124 119 126 132	
MUDDY RIVER								
Mt. Baldy R. S.*	9500	4/27	5.99		25.05		400 400	
FREMONT & ESCALANTE RIVERS								
Farnsworth Lake* Fish Lake	9900 8700	4/29 4/28 4/29 4/30	3.17 4.22 2.57 9.85		17.77 28.87 12.85 20.26	13.70 21.80 8.96 14.60	130 132 143 139	
VIRGIN RIVER								
		/ -	9.68 11.80	2.90 2.95	25.15 29.97	22.40 24.00	112 125	
SOUTHEASTERN UTAH DRAINAGES								
Camp Jackson	8600	4/22 4/22 4/23	5.80 4.90 3.90		21.35 17.70 19.90	23.90 18.90 22.70	89 94 88	



Agencies Cooperating in Utah Snow Surveys

U.S. GOVERNMENT AGENCIES

- U.S. Department of Agriculture Soil Conservation Service Forest Service
- U.S. Department of Commerce Weather Bureau
- U.S. Department of Interior
 Bureau of Reclamation
 Geological Survey
 National Park Service

STATE AGENCIES

Utah Agricultural Experiment Station
Utah Fish and Game Department
Utah State Engineer
Bear River Commissioner
Price River Commissioner
Provo River Commissioner
Sevier River Commissioners
Spanish Fork River Commissioner
Utah Lake and Jordan River Commissioner
Utah Water and Power Board

MUNICIPALITIES

Manti Salt Lake City

ORGANIZED PUBLIC AGENCIES

Beaver River Water Users Association
Board of Canal Presidents - Jordan River
Emery Canal and Reservoir Company
Moon Lake Water Users Association
Ogden River Water Users Association
Provo River Water Users Association
Strawberry Water Users Association
Sevier River Water Users Association

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